

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY REGION IX

IN THE MATTER OF:)
)
Sunoco, Inc.)
Barrick Gold U.S., Inc.)
) U.S. EPA Docket No. 9-2012-10
Respondents.) UNILATERAL ADMINISTRATIVE
) ORDER FOR THE PERFORMANCE
Proceeding Under Section 106(a)) OF A REMOVAL ACTION
of the Comprehensive Environmental)
Response, Compensation, and)
Liability Act of 1980,)
42 U.S.C. § 9606(a).)
)

This Order pertains to the cleanup of mine wastes from residential and commercial properties located in or near the town of McDermitt, Humboldt County, Nevada and on the nearby Fort McDermitt Indian Reservation. The mine wastes originated from the Cordero Mine and the McDermitt Mine ("Mines"), located in Humboldt County, Nevada, approximately eleven miles southwest of the town of McDermitt. These mercury mine sites are the primary source of calcined mercury tailings that are found in the town of McDermitt and on the Fort McDermitt Indian Reservation. This Order requires Sunoco, Inc. and Barrick Gold U.S., Inc. ("Respondents") to conduct the Removal Action described herein to abate an imminent and substantial endangerment to the public health, welfare or the environment that may be presented by the actual or threatened release of hazardous substances from mine tailings derived from the Mines, transported from the Mines, and disposed of at locations within the town of McDermitt, Nevada and on the Fort McDermitt Indian Reservation, including residential areas, commercial areas and school yards.

I. AUTHORITY

1. This Unilateral Administrative Order ("Order") is issued pursuant to the authority vested in the President of the United States by Section 106(a) of the Comprehensive Environmental Response, Compensation, and Liability Act of 1980, 42 U.S.C. § 9606(a), as amended by the Superfund Amendments and Reauthorization Act of 1986, and the Small Business Liability Relief and Brownfields Revitalization Act of 2002 ("CERCLA"). The President delegated this authority to the Administrator of the United States Environmental Protection Agency ("EPA" or "Agency") by Executive Order 12580, January 23, 1987, 52 Fed. Reg. 2923, and further delegated it to the Assistant Administrator for Solid Waste and Emergency Response and the Regional Administrators by EPA Delegation Nos. 14-14-A and 14-14-B. This authority has been duly redelegated to the Branch Chief, Superfund Division, EPA Region 9 (now titled "Assistant Director"), by delegations dated September 29, 1997, and November 16, 2001.

II. PARTIES BOUND

- 2. This Order shall apply to and be binding on Respondents. Respondents are responsible for carrying out all activities required by this Order. This Order shall be binding on Respondents and any agents, officers, employees, successors and assigns. Notwithstanding the terms of any contract or agreement, Respondents are responsible for compliance with this Order and for ensuring that their employees, contractors, and agents comply with this Order. Respondents are liable for carrying out all activities required by this Order.
- 3. No change in ownership or operational status will alter Respondents' obligations under this Order.
 - 4. Notwithstanding the terms of any contract or agreement, Respondents are

responsible for compliance with this Order and for ensuring that all employees, contractors, and agents comply with this Order. Respondents shall provide a copy of this Order to all contractors, subcontractors, and consultants that are retained by it to perform the work required by this Order within fourteen (14) days after the Effective Date of this Order or within two (2) working days of retaining their services, whichever is later.

5. Respondents may not convey any title, easement, or other interest that they may have in any property comprising the Site, as the term "Site" is defined below, without a provision permitting the continuous implementation of the provisions of this Order. If Respondents wish to transfer any title, easement, or other interest that they may have in any property comprising the Site, Respondents shall provide a copy of this Order to any subsequent owner(s) or successor(s) before any ownership rights are transferred. In such case, Respondents shall advise EPA no less than thirty (30) days prior to any anticipated transfer of interest.

III. **DEFINITIONS**

6. Unless otherwise expressly provided herein, the terms used in this Order that are defined in CERCLA or in regulations promulgated under CERCLA shall have the meaning assigned to them in CERCLA or in such regulations. Whenever the terms listed below are used in this Order, or in the Appendices attached hereto and incorporated hereunder, the following definitions shall apply:

"CERCLA" shall mean the Comprehensive Environmental Response,
Compensation, and Liability Act of 1980, as amended by the Superfund Amendments and
Reauthorization Act of 1986 and by the Small Business Liability Relief and Brownfields
Revitalization Act of 2002.

"Days" shall mean consecutive calendar days unless expressly stated otherwise.

"Working days" shall mean consecutive calendar days other than a Saturday, Sunday, or federal holiday. In computing any period of time under this Order where the last day would fall on a Saturday, Sunday, or federal holiday, the period shall run until the close of business of the next working day.

"EPA" shall mean the United States Environmental Protection Agency and any successor departments or agencies of the United States.

"National Contingency Plan" or "NCP" shall mean the National Oil and Hazardous Substances Pollution Contingency Plan promulgated pursuant to Section 105 of CERCLA, 42 U.S.C. § 9605, codified at 40 C.F.R. Part 300.

"Paragraph" shall mean a portion of this Order identified by an Arabic numeral.

"Properties" shall mean any residential, commercial, public or tribal properties in and around the town of McDermitt, Nevada and on the Fort McDermitt Indian Reservation where hazardous substances from the Cordero Mine or the McDermitt Mine have come to be located.

"Removal Action Memorandum" or "Action Memorandum" shall mean the EPA Region 9 Superfund decision document, dated October 16, 2012 and signed by Daniel A. Meer, which selected CERCLA response actions for the Property. The Removal Action Memorandum is included in this Order as Appendix A.

"Response Action" or "Removal Action" shall be those specific work items

Respondents are required to perform at the Site pursuant to this Order, as set forth in Section IX of this Order.

"Section" shall mean a portion of this Order identified by a Roman numeral, unless otherwise stated.

"Site" shall mean the Cordero mercury mine, including all associated lands and claims, and the McDermitt mercury mine, including all associated lands and claims, located in Humboldt County, Nevada, approximately eleven miles southwest of McDermitt, Nevada, and wherever hazardous substances from the Cordero Mine or McDermitt Mine have come to be located, including the Properties.

"State" shall mean the state of Nevada, and all of its political subdivisions.

"Tribe" shall mean the Fort McDermitt Paiute and Shoshone Tribe, which has jurisdiction over the Fort McDermitt Indian Reservation ("Reservation").

"Unilateral Order" or "Order" shall mean this Unilateral Administrative Order, EPA docket number 9-2012-10, and any Appendices attached hereto. In the event of a conflict between this Order and any Appendix, this Order shall control.

"United States" shall mean the United States of America.

IV. FINDINGS OF FACT

A. Site description

- 7. The Site consists of two closed mercury mines, the Cordero Mine and the McDermitt Mine along with any associated lands and claims, located in Humboldt County, Nevada, approximately 11 miles southwest of McDermitt, Nevada. The Site also includes residential, commercial and school properties where mine contamination has come to be located in and around the town of McDermitt, Nevada, and on the Fort McDermitt Indian Reservation.
- 8. McDermitt, Nevada is an unincorporated community situated on the Nevada-Oregon border and encompasses approximately 13.2 square miles (8,448 acres) of land area. McDermitt is served by U.S. Highway 95, a major north-south highway linking Boise, Idaho, 192 miles to the north, with Winnemucca, Nevada, 73 miles to the south. The town area is

primarily located east and west of U.S. Highway 95 within the Nevada state boundary; however, the community spans north into the Oregon state boundary. The town area located east of Highway 95 consists of several commercial businesses, numerous residential properties, several paved two lane residential access roads, and mostly unpaved property driveways. The town area located west of Highway 95 consists of several commercial businesses, residential properties, the east-west Cordero Mine Road, and several unpaved residential access roads. According to 2010 United States Census Bureau results, a total of 101 housing units are located within the town of McDermitt.

9. The Site also includes Properties within the nearby Fort McDermitt Indian Reservation, which is located in Humboldt County, Nevada, approximately 2.7 miles south of the town of McDermitt. Calcined material is known to be present in at least two locations on the Fort McDermitt Indian Reservation: an unpaved public access road off the North Road which leads to the Tribe's transfer station and an unpaved privately-owned residential driveway off of the South Road.

B. Mercury Mine Ownership and Operation

- 10. The Mines are located within the Opalite mining district, which is primarily a mercury-producing district, centered approximately 15 miles west of McDermitt, Nevada and extending north into southern Malheur County, Oregon. A brief description of each of the Mines is provided below.
- 11. **Cordero Mine.** The Cordero Mine was located on federally owned land by Esuibio Aznaraez, Tomas Alcorta and Juan Ondarza in 1929 when they staked unpatented lode claims. In 1939, Horse Heaven Mining Company acquired the lease to the Cordero Mine and proceeded to mine mercury from surface and pit mining. All of Horse Heaven Mining

Company's stock was acquired by Sun Oil Company in 1936. In 1941 Sun Oil Company formed a new subsidiary, Cordero Mining Company. By 1946, Horse Heaven Mining Company had sold all of its mining interests to Cordero Mining Company and Horse Heaven Mining Company was dissolved. In 1943, underground mining commenced at the Cordero Mine. Between 1939 and 1966, Sun Oil Company and its companies, Horse Heaven Mining Company and Cordero Mining Company, produced approximately 94,680 flasks of mercury from the Cordero Mine, or approximately 83% of the mine's total mercury production. In 1966, the Cordero Mine lease and the Cordero Mine assets were acquired by the Fred H. Lenway Company. In 1972, the Cordero Mining Company was liquidated into its parent, the Sun Oil Company. In 1975, Cordero Mining Company was dissolved, and the Sun Oil Company changed its name to Sun Company and eventually to Sunoco, Inc.

Mineral Management Company, as general partner of the Mineral Exploration Company, Ltd. of New Jersey, acquired the leases to the Cordero Mine and surrounding area. In 1972, an option was granted to American Exploration and Mining Company ("Amex") that resulted in a joint a venture between Mineral Exploration Company (49%) and Amex, Inc. (51%). In 1973, Amex changed its name to Placer Amex, Inc., 100% owned by Placer Development Limited of Canada, which took the lead in exploration and ultimate development of the McDermitt Mine in 1975. The McDermitt Mine is located less than one mile northeast of the Cordero Mine. The McDermitt Mine operated from 1975 until its closure in 1990 and produced approximately 400,000 flasks of mercury during this period. During 1979 and 1980, Placer Amex acquired patents on a number of claims that cover the McDermitt Mine and most of the waste dumps and tailings pond. In 1983, the joint venture agreement was reconfigured to include Placer U.S. Inc.,

Exploration Company and Sterling Wenture Ltd., a New Jersey partnership. In 1987, Placer U.S. Inc. changed its name to Placer Dome U.S. Inc. In 2006, Barrick Gold Corporation acquired 100% of the stock of Placer Dome Inc. which owned100% of the stock of Placer Dome U.S. Inc. In 2007, Placer Dome U.S. Inc. was renamed Barrick Gold U.S., Inc. Ownership of the patented claims remains with the joint venture in which Barrick Gold U.S., Inc. is the majority partner (51%). Calcined mercury tailings from the Cordero Mine are located on the patented claims owned by Barrick Gold U.S., Inc. and on federal land, managed by the U.S. Bureau of Land Management.

C. Release Characteristics

potential environmental contaminant problems at the McDermitt Mine site was completed by EPA Region IX. The PAR identified annual site inspections by the Nevada Division of Mine Inspection and the NDEP that indicated "hazardous waste problems" associated with the containment of disposed tailings and excessive blood mercury levels in employees working the retort section of the mill. The PAR recommended that more information be gathered regarding general site history, groundwater well locations, population density, and possible future sample locations in order to determine what further action under the Comprehensive Environmental Response, Compensation, and Liability Act ("CERCLA") may be necessary. In February 1988, EPA conducted a Site Inspection ("SI") at the McDermitt Mine. At that time, the McDermitt Mine was not in operation; however, it was reported there were plans for the mine to re-open in the fall of 1988. EPA did not collect any environmental media data (e.g., soil, water) during the SI and recommended no further action under CERCLA.

- 14. On December 1, 2009, staff from the EPA Site Assessment program and Emergency Response program conducted a site visit at the Mines to determine if conditions had significantly changed since the 1988 EPA SI Report. This visit was prompted by a request for assistance from the Fort McDermitt Paiute and Shoshone Tribe. During that visit, EPA staff obtained information that calcined tailings from the Mines had been used as fill at various locations in the town of McDermitt and on the Fort McDermitt Indian Reservation.
- study areas were identified for assessment sampling: the Fort McDermitt Indian Reservation, the McDermitt Combined School; roadways in the area of McDermitt, the Mines; and seasonal surface water drainage pathways downgradient of the Mines. Results of this removal assessment indicated elevated levels of mercury and arsenic at multiple locations including the McDermitt Combined School, numerous roadways in the town of McDermitt and at two locations on the Fort McDermitt Indian Reservation (including one residential driveway and the dirt road leading to the Tribal transfer station).
- 16. In June 2011, EPA and the U.S. Geological Survey collected 23 surface soil and calcines samples to evaluate the bioavailability of mercury and arsenic. This included analyzing the samples for total mercury, methyl mercury and elemental mercury, conducting sequential extraction analyses, and analyzing mercury speciation by Extended X-Ray Fluorescence at the Stanford Synchrotron Radiation Lightsource. EPA used this data to calculate and identify the following site-specific removal action levels for mercury and arsenic in residential soil ("Removal Action Levels for Residential Soil"): 80 parts per million ("ppm") mercury and 60 ppm arsenic in residential soil. EPA did not calculate site-specific removal action levels for non-residential soil, but instead is applying the EPA Region IX Regional Screening Levels ("RSLs")

of 310 ppm for mercuric chloride (and other mercury salts) and 160 ppm for arsenic.

- 17. In June 2012, EPA conducted residential soil sampling of properties where it appeared that calcined tailings may have been used as fill. EPA received permission to sample approximately sixty (60) properties. Soil samples were only collected at properties where calcine material was observed to be present. A total of 92 composite soil samples (excluding duplicates) were collected from within the project area and subjected to field XRF analysis; a total of 44 land parcels, consisting of 92 decision units, were sampled. Of the 92 field XRF analyzed composite soil samples, 55 samples exceeding the soil screening level (SSL) for arsenic and/or mercury were submitted to U.S. EPA Region 9 Laboratory for analysis. Of the 55 laboratory-analyzed property samples, 20 samples (36%) had arsenic concentrations that met or exceeded the residential action level of 60 mg/kg. Of the 55 laboratory-analyzed property samples, 42 samples (76%) had mercury concentrations that met or exceeded the residential action level of 80 mg/kg. Furthermore, areas adjacent to the football field at the McDermitt School were found to have mercury and arsenic concentrations exceeding the Removal Action Levels for Residential Soil, but did not exceed the non-residential RSLs.
- 18. During the course of conducting the removal assessment, EPA conducted numerous informal interviews with residents. Initial interviews indicated that calcined tailings present in the town of McDermitt and on the Fort McDermitt Indian Reservation were obtained from the Cordero Mine calcined tailings pile, which straddles the line between property owned by Barrick as patented claims that are part of the McDermitt Mine site and federal property, part of the Cordero Mine site, that is managed by the U.S. Bureau of Land Management. Local contractors, residents and municipal organizations obtained calcined tailings from the Cordero Mine calcined tailings pile for use as fill at multiple locations within the town of McDermitt and

on the Fort McDermitt Indian Reservation. Calcined tailings also appear to have been used in road construction in multiple locations in northern Humboldt County, Nevada and southern Malheur County, Oregon.

- 19. Mercury and arsenic are naturally occurring elements. Analytical results of samples from the Site indicate that concentrations of mercury and arsenic identified in the soil media exceed background and risk-based levels determined by EPA for the Site. Mercury is a hazardous substance as defined by Section 101(14) of CERCLA. Mercury exposure occurs from breathing air contaminated with mercury, ingesting contaminated water and food. Mercury, at high levels of exposure, may cause damage to the brain, kidneys and developing fetus. Effects on brain functioning may result in irritability, tremors, changes in vision or hearing, and memory problems. The nervous system is very sensitive to all forms of mercury. Short-term exposure to high levels of mercury vapors can cause lung damage, nausea, vomiting, diarrhea, increased blood pressure or heart rate, skin rashes and eye irritation. Young children are more sensitive to mercury than adults.
- 20. Young children and adults may experience adverse health effects when exposed to elevated concentrations of arsenic and other metals in the soil. The primary route of exposure is via incidental ingestion of the contaminated soil. Direct ingestion of contaminated soil can result from actual consumption of soil or through the mouthing of contaminated objects.

 Children are the most susceptible to exposure through this pathway. Other routes of exposure include inhalation of wind- blown soil particles and dermal contact with the soil.
- 21. Arsenic is a hazardous substance as defined by Section 101(14) of CERCLA.

 Excess exposure to arsenic is known to cause a variety of adverse health effects in humans.

 These effects depend on exposure level and duration. Arsenic is a known human carcinogen.

Inhalation exposure is associated with increased risk of lung, gastrointestinal, renal or bladder cancer. Oral exposure to arsenic is associated with skin, liver, and bladder cancer. At very high doses, oral exposure to arsenic elicits nausea and vomiting. Lower doses over a chronic time period may elicit skin abnormalities, such as hyperkeratosis; kidney, and liver toxicity.

22. Due to the fact that the majority of calcined tailings sampled during the removal assessment contained mercury and arsenic in concentrations exceeding the Removal Action Levels for Residential Soil, EPA concludes that it is necessary to remove all calcined tailings from residential Properties, unless Respondents can show through subsequent sampling, acceptable to EPA, that the calcined tailings from a particular residential Property do not contain mercury or arsenic in concentrations exceeding the Removal Action Levels for Residential Soil, or unless EPA approves a Property-specific exception for certain long driveways, as described in Paragraph 37(b) below. With respect to areas with calcined tailings at the McDermitt School, EPA concludes the presence of mercury and arsenic at levels exceeding the Removal Action Levels at the school warrants covering these calcined tailings, given the risk of exposure to children.

V. CONCLUSIONS OF LAW

- 23. The Site is a "facility" as that term is defined in Section 101(9) of CERCLA, 42 U.S.C. § 9601(9).
- 24. Sunoco, Inc. ("Sunoco") is a "person" as that term is defined in Section 101(21) of CERCLA, 42 U.S.C. § 9601(21).
- 25. Barrick Gold U.S., Inc. ("Barrick") is a "person as that term is defined in Section 101(21) of CERCLA.
 - 26. Respondent Sunoco is a responsible party under Section 107(a) of CERCLA, 42

- U.S.C. § 9607(a), and is jointly and severally liable for performance of response action and for response costs incurred and to be incurred at the Site. Respondent Sunoco's predecessor, Cordero Mining Company, operated the Site from approximately 1941 to 1966 and was responsible for mining activities carried out at the Cordero Mine and the disposal of calcined mercury tailings at the Site. Respondent Sunoco, a successor in interest to Cordero Mining Company, is "liable" within the meaning of Section 107(a) of CERCLA, 42 U.S.C. § 9607(a)(2) as an owner and operator at the time of disposal, and is subject to this Order under Section 106(a) of CERCLA, 42 U.S.C. § 9606(a).
- U.S.C. § 9607(a), and is jointly and severally liable for the performance of response action and for response costs incurred and to be incurred at the Site. Respondent Barrick is the current owner of patented mining claims upon which a portion of the calcined mine tailings from the Cordero Mine are located. Respondent Barrick is the successor in interest to Placer Amex, Inc., Placer U.S., Inc. and Placer Dome U.S., Inc., owners of the Site during which time calcined mine tailings were removed from the tailings pile located on patented claims held by these entities and disposed on the Properties. Respondent Barrick is liable within the meaning CERCLA Section 107(a)(1) and 107(a)(2). 42 U.S.C. §9607(a)(1) & (a)(2).
- 28. The toxic materials identified in the Action Memorandum are "hazardous substances" as that term is defined in Section 101(14) of CERCLA, 42 U.S.C. § 9601(14) and by meeting requirements set forth in 40 C.F.R. § 261.24. Each disposal or dumping of hazardous substances at or around the Properties constitutes a "release," as that term is defined in Section 101(22) of CERCLA, 42 U.S.C. § 9601(22).
 - 29. The actual or threatened release of hazardous substances from the Site constitutes

an imminent and substantial endangerment to the public health or welfare or the environment, within the meaning of Section 106(a) of CERCLA, 42 U.S.C. § 9606(a).

VI. DETERMINATIONS

Based on the Findings of Fact and the Conclusions of Law stated herein, EPA has made the following determinations:

- 30. That an actual or threatened release of hazardous substances from the Site presents an imminent and substantial endangerment to the public health or welfare or the environment.
- 31. That conditions at the Site constitute a threat to public health or welfare or the environment based on consideration of the factors stated in the NCP at 40 C.F.R. § 300.415(b), and that the actions required by this Order are necessary to protect the public health or welfare or the environment.
- 32. That the Removal Action required by this Order, if properly performed, will be consistent with the NCP and CERCLA, and is appropriate to protect the public health or welfare or the environment.

VII. NOTICE TO THE STATE AND TRIBE

33. Pursuant to Section 106(a) of CERCLA, 42 U.S.C. § 9606(a), EPA has notified the State and Tribe of the issuance of this Order by providing a copy of this Order.

VIII. EFFECTIVE DATE

34. This Order is deemed effective ten (10) days after the date the Order is signed (the "Effective Date").

IX. ORDER

35. Based on the Findings of Fact, Conclusions of Law, and Determinations, EPA

hereby orders Respondents to perform the specific work set forth below under the direction of the EPA On-Scene Coordinator ("OSC"), as designated in Section XIV, and to comply with all requirements of this Order until EPA provides notice that the Response Action is complete.

A. Work to be Performed

- 36. Respondents shall work with the property owners to restrict access to all work areas of the Properties for the duration of the response action required by this Order.

 Respondents shall not allow any soil or waste material to be removed from or brought into the Properties at the Site without prior EPA approval.
- 37. Within twenty-one (21) working days after the Effective Date of this Order, Respondents shall submit a Work Plan for the removal activities to be performed as set forth in this Order and the attached Scope of Work (Appendix B). The Work Plan shall provide a concise description of the activities to be conducted to comply with the requirements of this Order, and shall include a proposed schedule for implementing and completing such activities. The Work Plan, which will be subject to EPA approval, shall comply with the requirements provided in Paragraphs 36-43, and at a minimum, shall require the Respondents to implement and complete the following removal activities beginning within 5 working days (or as otherwise approved by EPA) of EPA approval or modification of the Work Plan:
 - (a) Removal of Certain Calcined Tailings:
 - Removal of all calcined tailings from residential Properties within the town of McDermitt
 and on the Fort McDermitt Paiute Shoshone Indian Reservation, unless subsequent
 sampling by the Respondents, as approved by EPA, shows that the calcined tailings from
 a particular residential Property do not contain mercury or arsenic in concentrations
 exceeding the Removal Action Levels for Residential Soil. The removal action shall

- include: (i) approximately 51 residential Properties in the town of McDermitt identified during the removal assessment; (ii) one residential Property on the Fort McDermitt Paiute Shoshone Indian Reservation identified during the removal assessment; and (iii) any additional residential Properties containing calcined tailings which EPA may identify during the Removal Action.
- Transport of all excavated calcined tailings to the Cordero Mine calcined tailings pile on the Barrick property for disposal as approved by EPA.
- Backfilling of all excavated areas using suitable fill material.
 - (b) Covering of Certain Calcined Tailings
- Covering in-place of certain non-residential areas containing calcined tailings, as
 identified by EPA, including (i) the large parking area adjacent to the football field at the
 McDermitt School; and (ii) long driveways at larger residential Properties which EPA, at
 its discretion, determines may be covered rather than excavated.
- Covering would consist of placing an appropriate thickness of suitable material.
- 38. Within twenty-one (21) days after the Effective Date of this Order, the Respondents shall provide EPA with documentation that adequately demonstrates their financial ability to complete the work to be performed pursuant to this Order. Examples of adequate financial documentation that EPA may accept include, but are not limited to, a signed contract or guarantee on the part of the Respondents' contractor(s) that it/they will complete the work to be performed (including payment terms, such as whether the contract is prepaid), an irrevocable letter of credit payable to EPA from a financial institution, a policy of insurance covering site Response Actions and contingent claims that provides EPA with acceptable rights as a beneficiary thereof, an escrow account for the value of the work to be performed; or a

demonstration by the Respondents that they have adequate net worth and /or cash flow to pay for the work to be performed (which may include most recent financial statements, auditors' reports, annual reports, SEC filings and the like).

- 39. The Work Plan required in Paragraph 37 shall be reviewed by EPA, which may approve, disapprove, require revisions, or modify the Work Plan. Respondents shall prepare the Work Plan elements described below as separate documents for approval by EPA. Once approved or modified, each element of the Work Plan shall be deemed to be incorporated into and made a fully enforceable part of this Order. The Respondents shall implement the Work Plan as finally approved or modified by the EPA. In addition to the requirements listed in Paragraph 37, the Work Plan shall include:
 - A) A Health & Safety Plan, prepared in accordance with EPA's Superfund Standard Operating Safety Guide, dated June 1992, which complies with all current OSHA regulations applicable to Hazardous Waste Operations and Emergency Response, 29 C.F.R. Part 1910. Respondents shall incorporate all changes to the Health & Safety Plan recommended by EPA and implement the Health & Safety Plan throughout the performance of the Removal Action; and
 - B) In the event that the Work Plan includes taking of contaminant samples for analysis, a Quality Assurance Project Plan ("QAPP") that is consistent with EPA Guidance for Quality Assurance Project Plans (EPA QA/G-5); Preparation of a U.S. EPA Region 9 Field Sample Plan for EPA-Lead Superfund Projects (Document Control No.: 9QA-05-93); and Guidance for the Data Quality Objectives Process (EPA QA/G-4). Soil sampling activities shall utilize proper soil assessment techniques as defined in EPA Document SW-846, Chapter 9 (EPA Environmental Response Team Standard Operating

Procedures) or appropriate ASTM standards.

- 40. Respondents shall provide EPA with a written report on completion of any transportation of hazardous substances or wastes for disposal or recycling. This report should contain a summary of the activities to comply with this Order. Within forty-five (45) days after completing the Response Action, Respondents shall provide EPA with this final summary report, which also shall include all invoices submitted by contractors (which shall identify specific work performed), and copies of all analytical data generated during the response action.
- 41. All documents, including technical reports, and other correspondence to be submitted by the Respondents pursuant to this Order, shall be sent by over-night mail to the following addressees or to such other addressees as EPA hereafter may designate in writing, unless the OSC provides written permission to send particular documents by email, and shall be deemed submitted on the date received by EPA.

Tom Dunkelman, On-Scene Coordinator US Environmental Protection Agency EPA, Region 9 901 South Stewart Street, Suite 4001 Carson City, NV 89701

Respondents shall submit two (2) copies of each document to EPA.

42. EPA will review, comment, and approve or disapprove each plan, report, or other deliverable submitted by Respondents. All EPA comments on draft deliverables shall be incorporated by the Respondents. EPA will notify the Respondents in writing of EPA's approval or disapproval of a final deliverable. In the event of any disapproval, EPA will specify the reasons for such disapproval, EPA's required modifications, and a time frame for submission of the revised report, document, or deliverable. If the modified report, document or deliverable is again disapproved by EPA, EPA first shall notify the Respondents of its disapproval of the

resubmitted report, document, or deliverable, and then may draft its own report, document or deliverable and incorporate it as part of this Order, may seek penalties from the Respondents for failing to comply with this Order, and may conduct the remaining work required by this Order and seek to recover costs from Respondents.

43. For purposes of this Order, EPA's authorized representatives will include, but not be limited to, consultants and contractors hired by EPA to oversee the activities required by this Order.

B. Selection of Contractor(s) and Subcontractor(s)

- 44. All work performed by or on behalf of Respondents pursuant to this Order shall be performed by qualified individuals or contractors with expertise in hazardous waste site investigation or remediation, unless agreed otherwise by EPA. Respondents shall, within seven (7) days after the Effective Date of this Order, notify EPA in writing of the name, title and qualifications of the individual(s) who will be responsible for carrying out the terms of this Order, and the name(s) of any contractor(s) or subcontractor(s). The qualifications of the persons, contractors, and subcontractors undertaking the work for Respondents shall be subject to EPA review and approval.
- 45. If EPA disapproves of any person's or contractor's technical or work-experience qualifications, EPA will notify the Respondents in writing. Respondents shall, within three (3) working days of Respondents' receipt of EPA's written notice, notify EPA of the identity and qualifications of the replacement(s). Should EPA disapprove of the proposed replacement(s), Respondents shall be deemed to have failed to comply with the Order.
- 46. Respondents may propose to change the individual(s), contractor(s), or subcontractor(s) retained to direct and supervise the work required by this Order. If Respondents

wish to propose such a change, Respondents shall notify EPA in writing of the name, title, and qualifications of the proposed individual(s), proposed contractor(s), or proposed subcontractor(s), and such individual(s), contractor(s) or subcontractor(s) shall be subject to approval by EPA in accordance with the terms of Paragraphs 44 and 45, above. The naming of any replacement(s) by Respondents shall not extend any deadlines required by this Order nor relieve the Respondents of any of their obligations to perform the work required by this Order.

- 47. Respondents will notify EPA of the respective field activities at least seventy-two (72) hours before initiating them so that EPA may adequately schedule oversight tasks.
- 48. Respondents shall submit to EPA a certification that Respondents or their contractor(s) and subcontractor(s) have adequate insurance coverage, subject to approval of EPA, to compensate for liabilities for injuries or damages to persons or property that may result from the activities to be conducted by or on behalf of Respondents pursuant to this Order. Adequate insurance shall include comprehensive general liability insurance and automobile insurance with limits of one million dollars, combined single limit. If the Respondents demonstrate by evidence satisfactory to EPA that any contractor or subcontractor maintains insurance equivalent to that described above, or insurance covering the same risks but in a lesser amount, then the Respondents need to provide only that portion of the insurance described above that is not maintained by such contractor or subcontractor. Respondents shall ensure that such insurance or indemnification is maintained for the duration of performance of the work required by this Order. Respondents shall ensure that the United States is named as an additional insured on any such insurance policies.

C. General Provisions:

49. All work required by this Order shall be conducted in accordance with: CERCLA;

the NCP; EPA Region 9 "Guidance for Preparing Quality Assurance Project Plans for Superfund Remedial Projects" (EPA, November 1992); any final amended or superseding versions of such documents provided by EPA; other applicable EPA guidance documents; any Work Plan or individual components approved or modified pursuant to Paragraph 42 of this Order; and any report, document or deliverable prepared by EPA because Respondents failed to comply with this Order.

- 50. All plans, schedules, and other reports that require EPA's approval and are required to be submitted by the Respondents pursuant to this Order shall, after approval by EPA, be incorporated into and enforceable under this Order.
- 51. EPA will oversee Respondents' activities as specified in Section 104(a)(1) of CERCLA, 42 U.S.C. § 9604(a)(1). Respondents will support EPA's initiation and implementation of activities needed to carry out its oversight responsibilities. Respondents also shall cooperate and coordinate the performance of all work required to be performed under this Order with all other work being performed at the Site, including work performed by EPA, the State, or any other party performing work at the Site with the approval of EPA.
- 52. Respondents shall perform all actions required pursuant to this Order in accordance with all applicable local, state, and federal laws and regulations, including, but not limited to those set forth in the attached October 16, 2012 Action Memorandum, except as provided in Section 121(e) of CERCLA, 42 U.S.C. § 6921(e), and 40 C.F.R. §§ 300.400(e) and 300.415(j). In accordance with 40 C.F.R. § 300.415(j), all on-Site actions required pursuant to this Order shall, to the extent practicable, as determined by EPA, considering the exigencies of the situation, attain applicable or relevant and appropriate requirements under federal environmental or state environmental or facility siting laws.

X. NOTICE OF INTENT TO COMPLY

53. Unless a conference is requested pursuant to Paragraph 54, Respondents shall, within ten (10) days after this Order is signed, provide written notice to EPA of Respondents' irrevocable intent to comply with this Order. If a conference is requested pursuant to Paragraph 54, the notice of intent to comply is due within three (3) days after the conference. Failure to respond, or failure to agree to comply with this Order, shall be deemed a refusal to comply with this Order. Such written notice shall be sent to:

Larry Bradfish, Assistant Regional Counsel Office of Regional Counsel U.S. EPA, Region 9, ORC-3 75 Hawthorne Street San Francisco, CA 94105 Telephone: (415) 972-3934

Fax: (415) 947-3571

XI. OPPORTUNITY TO CONFER

- 54. Respondents may, within seven (7) days after this Order is signed, request a conference with the Section Chief of the Emergency Response Section in the Emergency Response, Preparedness & Prevention Branch in the EPA Region 9 Superfund Division, or whomever the Section Chief may designate. If requested, the conference shall occur within fourteen (14) days of the request, unless extended by mutual agreement of the Parties, at EPA's Regional Office, 75 Hawthorne Street, San Francisco, California.
- 55. At any conference held pursuant to Respondents' request, the Respondents may appear in person, or be represented by an attorney or other representative. If Respondents desire such a conference, Respondents shall contact Larry Bradfish, Assistant Regional Counsel, at (415) 972-3934.
 - 56. The purpose and scope of any such conference held pursuant to this Order shall be

limited to issues involving the implementation of the Response Action required by this Order and the extent to which Respondents intend to comply with this Order. If such a conference is held, the Respondents may present any evidence, arguments or comments regarding this Order, its applicability, any factual determinations on which the Order is based, the appropriateness of any action that the Respondents are ordered to take, or any other relevant and material issue. Any such evidence, arguments or comments should be reduced to writing and submitted to EPA within three (3) days following the conference. This conference is not an evidentiary hearing, and does not constitute a proceeding to challenge this Order. It does not give Respondents a right to seek review of this Order, or to seek resolution of potential liability, and no official record of the conference will be made. If no conference is requested, any such evidence, arguments or comments must be submitted in writing within three (3) days following the Effective Date of this Order. Any such writing should be directed to the following address:

Larry Bradfish, Assistant Regional Counsel Office of Regional Counsel U.S. EPA, Region 9, ORC-3 75 Hawthorne Street San Francisco, CA 94105

57. Respondents are hereby placed on notice that EPA will take any action that may be necessary in the opinion of EPA for the protection of public health and welfare and the environment, and Respondents may be liable for the costs of those actions under Section 107(a) of CERCLA, 42 U.S.C. § 9607(a).

XII. ENDANGERMENT AND EMERGENCY RESPONSE

58. In the event of any action or occurrence during the performance of the work that causes or threatens to cause a release of a hazardous substance or that may present an immediate threat to public health or welfare or the environment, Respondents shall immediately take all

appropriate action(s) to prevent, abate, or minimize the threat, and shall immediately notify EPA's primary OSC, or, if the primary OSC is unavailable, EPA's alternate OSC, as designated below in Paragraph 64. If neither of these persons is available, Respondents shall notify the EPA Emergency Response Unit, Region 9, by calling (800) 300-2193. Respondents shall take such action(s) in consultation with EPA's OSC and in accordance with all applicable provisions of this Order, including but not limited to the approved Health & Safety Plan.

59. Nothing in the preceding Paragraph shall be deemed to limit any authority of the United States to take, direct, or order all appropriate action to protect human health and the environment or to prevent, abate, or minimize an actual or threatened release of hazardous substances at or from the Site.

XIII. MODIFICATION OF WORK REQUIRED

- 60. In the event of unanticipated or changed circumstances at the Site, Respondents shall notify the EPA OSC by telephone within twenty-four (24) hours of discovery of the unanticipated or changed circumstances. This verbal notification shall be followed by written notification postmarked no later than within three (3) days of discovery of the unanticipated or changed circumstances.
- 61. The EPA may determine that in addition to tasks addressed herein, additional work may be required to address the unanticipated or changed circumstances referred to in Paragraph 60. Where consistent with Section 106(a) of CERCLA, EPA may direct, as an amendment to this Order, that Respondents perform these tasks in addition to those required herein. Respondents shall implement the additional tasks that EPA identifies. The additional work shall be completed according to the standards, specifications, and schedules set forth by EPA in any modifications to this Order.

XIV. DESIGNATED PROJECT MANAGERS

- OSC and designated representative at the Site, who shall have the authorities, duties, and responsibilities vested in the OSC by the NCP. This includes, but is not limited to, the authority to halt, modify, conduct, or direct any tasks required by this Order or undertake the Response Action (or portions of the Response Action) when conditions at the Site present or may present a threat to public health or welfare or the environment as set forth in the NCP. Within three (3) days of the Effective Date of this Order, Respondents shall designate a Project Coordinator who shall be responsible for overseeing Respondent' implementation of this Order. To the maximum extent possible, all oral communications between Respondents and EPA concerning the activities performed pursuant to this Order shall be directed through EPA's OSC and Respondents' Project Coordinator. All documents, including progress and technical reports, approvals, and other correspondence concerning the activities performed pursuant to the terms and conditions of this Order, shall be delivered in accordance with Paragraph 41, above.
- 63. EPA and Respondents may change their respective OSC and Project Coordinator. Notification of such a change shall be made by notifying the other party in writing at least five (5) days prior to the change, except in the case of an emergency, in which case notification shall be made orally followed by written notification as soon as possible.
- 64. Consistent with the provisions of this Order, the EPA designates Harry Allen as an alternate OSC, in the event Tom Dunkelman is not present at the Site or is otherwise unavailable. During such times, Harry Allen shall have the authority vested in the OSC by the NCP, as set forth in Paragraph 62 above.
 - 65. The absence of the EPA OSC from the Site shall not be cause for the stoppage of

work. Nothing in this Order shall limit the authority of the EPA OSC under federal law.

XV. SITE ACCESS

- 66. To the extent Respondents have any control over all or portions of the Site, it shall permit EPA and its authorized representatives, including its contractors and the State, to have access at all times to the Site to monitor any activity conducted pursuant to this Order and to conduct such tests or investigations as EPA deems necessary. Nothing in this Order shall be deemed a limit on EPA's authority under federal law to gain access to the Site.
- 67. To the extent that Respondents require access to property other than Property that they own to carry out the terms of this Order and to the extent that EPA has not already secured access from the property owner(s), Respondents shall, within a reasonable time to implement the requirements of this Order, obtain access for: EPA, its contractors, oversight officials, or other authorized representatives; state oversight officials or contractors; and Respondents and their authorized representatives. If Respondents fail to gain access within the time period necessary to implement the requirements of this Order, Respondents shall continue to use best efforts to obtain access until access is granted. For purposes of this Paragraph, "best efforts" include, but are not limited to, the payment of money as consideration for access. Respondents shall cooperate and use best efforts to coordinate the performance of all work required under this Order with any reasonable access requirements of the landowners. If access is not provided within the time referenced above, EPA may obtain access under Sections 104(e) or 106(a) of CERCLA and recover any costs incurred pursuant to Section XVI of this Order.

XVI. REIMBURSEMENT OF OVERSIGHT COSTS

68. Respondents shall reimburse EPA, on written demand, for all response costs incurred by the United States in overseeing Respondent's implementation of the requirements of

this Order, unless otherwise exempted from this requirement by federal law. EPA may submit to Respondents on a periodic basis a bill for all response costs incurred by the United States with respect to this Order. Respondents shall, within thirty (30) days of receipt of the bill, remit by cashier's or certified check for the amount of those costs made payable to the "Hazardous Substance Superfund," to the following address:

U.S. Environmental Protection Agency Superfund Payments Cincinnati Finance Center P.O. Box 97907 St. Louis, MO 63197-9000

Respondents shall send a cover letter with any check and the letter shall identify the McDermitt Site by name and Site ID number, 09 WL, and make reference to this Order, including the EPA docket number stated above. Respondents shall send notification of any amount paid, including a photocopy of the check, simultaneously to the EPA OSC.

69. Interest at the rate established under Section 107(a) of CERCLA shall begin to accrue on the unpaid balance from the due date of the original demand notwithstanding any dispute or objection to any portion of the costs.

XVII. <u>DELAY IN PERFORMANCE</u>

- 70. Any delay in the performance of any requirement of this Order that, in the EPA's sole judgment and discretion, is not properly justified by Respondents under the terms of this Section shall be considered a violation of this Order. Any delay in performance of any requirement of this Order shall not affect any other obligation of Respondents under the terms and conditions of this Order.
- 71. Respondents shall notify EPA of any delay or anticipated delay in performing any requirement of this Order. Such notification shall be made by telephone to EPA's primary OSC

within twenty-four (24) hours after Respondents first know or should have known that a delay might occur. Respondents shall adopt all reasonable measures to avoid or minimize any such delay. Within three (3) days after notifying EPA by telephone, Respondents shall provide written notification fully describing the nature of the delay, any justification for delay, any reason why the Respondents should not be held strictly accountable for failing to comply with any relevant requirements of this Order, the measures planned and taken to minimize the delay, and a schedule for implementing the measures that will be taken to mitigate the effect of the delay. Increased costs or expenses associated with implementation of the activities called for in this Order are not justifications for any delay in performance.

- 72. If Respondents are unable to perform any activity or submit any document within the time required under this Order, the Respondents may, prior to the expiration of the time, request an extension of time in writing. The extension request shall include a justification for the delay. The submission of an extension request shall not itself affect or extend the time to perform any of Respondents' obligations under this Order.
- 73. If EPA determines that good cause exists for an extension of time, it may grant a request made by Respondents pursuant to Paragraph 72 above, and specify in writing to the Respondents the new schedule for completion of the activity or submission of the document for which the extension was requested.

XVIII. RECORD PRESERVATION

74. Respondents shall maintain, during the pendency of this Order, and for a minimum of five (5) years after EPA provides notice to Respondents that the work has been completed, a depository of the records and documents required to be prepared under this Order. In addition, Respondents shall retain copies of the most recent version of all documents that

relate to hazardous substances at the Site and that are in their possession or in the possession of their employees, agents, contractors, or attorneys. After this five-year period, Respondents shall notify EPA at least thirty (30) days before the documents are scheduled to be destroyed. If EPA so requests, Respondents shall provide these documents to EPA.

XIX. ENFORCEMENT AND RESERVATIONS

- of CERCLA, 42 U.S.C. § 9607, for recovery of any response costs incurred by the United States related to this Order or otherwise incurred at the Site and not reimbursed by Respondent. This reservation shall include but not be limited to past costs, direct costs, indirect costs, the costs of oversight, and the costs of compiling the cost documentation to support oversight costs, as well as accrued interest as provided in Section 107(a) of CERCLA, 42 U.S.C. § 9607(a).
- 76. Notwithstanding any other provision of this Order, at any time during the Response Action, EPA may perform its own studies, complete the Response Action (or any portion of the Response Action) and seek reimbursement from Respondents for its costs, or seek any other appropriate relief.
- 77. Nothing in this Order shall preclude EPA from taking any additional enforcement action, including modification of this Order or issuance of additional Orders, or additional remedial or removal actions as EPA may deem necessary, or from requiring Respondents in the future to perform additional activities pursuant to CERCLA, 42 U.S.C. § 9601(a), et seq., or any other applicable law. Respondents may be liable under CERCLA Section 107(a) for the costs of any such additional actions.
- 78. Notwithstanding any provision of this Order, the United States hereby retains all of its information gathering, inspection and enforcement authorities and rights under CERCLA,

the Resource Conservation and Recovery Act, or any other applicable statutes or regulations.

- 79. Notwithstanding compliance with the terms of this Order, including the completion of the EPA-approved Response Action, Respondents are not released from liability, if any, for any enforcement actions beyond the terms of this Order taken by EPA.
- 80. EPA reserves the right to take any enforcement action pursuant to CERCLA or any other legal authority, including the right to seek injunctive relief, monetary penalties, reimbursement of response costs, and punitive damages for any violation of law or this Order.
- 81. EPA expressly reserves all rights and defenses that it may have, including the EPA's right both to disapprove of work performed by Respondents and to request Respondents to perform tasks in addition to those detailed in Section IX of this Order.
- 82. This Order does not release Respondents from any claim, cause of action or demand in law or equity, including, but not limited to, any claim, cause of action, or demand that lawfully may be asserted by representatives of the United States or the State.
- 83. No informal advice, guidance, suggestions, or comments by EPA regarding reports, plans, specifications, schedules, and any other writing submitted by Respondents will be construed as relieving Respondents of their obligation to obtain such formal approval as may be required by this Order.

XX. ADMINISTRATIVE RECORD

84. The Administrative Record supporting this removal action will be available for review at the U.S. Environmental Protection Agency Superfund Records Center, located at 95 Hawthorne Street, Suite 403S, San Francisco, California 94105, Ph. 415-536-2000. See 40 C.F.R. Sections 300.415(n)(2), 300.800, 300.820.

XXI. SEVERABILITY

85. If any provision or authority of this Order or the application of this Order to any circumstance is held by a court to be invalid, the application of such provision to other circumstances and the remainder of this Order shall not be affected thereby, and the remainder of this Order shall remain in force.

XXII. <u>DISCLAIMER</u>

86. The United States, by issuance of this Order, assumes no liability for any injuries or damages to persons or property resulting from acts or omissions by Respondents, or their employees, agents, successors, assigns, contractors, or consultants in carrying out any action or activity pursuant to this Order. Neither EPA nor the United States shall be held as a party to any contract entered into by Respondents, or their employees, agents, successors, assigns, contractors, or consultants in carrying out any action or activity pursuant to this Order. This Order does not constitute a pre-authorization of funds under Section 111(a)(2) of CERCLA, 42 U.S.C. § 9611(a)(2).

XXIII. PENALTIES FOR NONCOMPLIANCE

87. Respondents are advised pursuant to Section 106(b) of CERCLA, 42 U.S.C. § 9606(b), that violation of this Order or subsequent failure or refusal to comply with this Order, or any portion thereof, may subject Respondents to a civil penalty of up to \$37,500 per day for each day in which such violation occurs, or such failure to comply continues. Failure to comply with this Order, or any portion thereof, also may subject Respondents to liability for punitive damages in an amount three times the amount of any cost incurred by the government as a result of the failure of Respondents to take proper action, pursuant to Section 107(c)(3) of CERCLA, 42 U.S.C. § 9607(c)(3).

XXIV. TERMINATION AND SATISFACTION

88. The provisions of this Order shall be deemed satisfied on Respondents' receipt of written notice from EPA that Respondents have demonstrated to the satisfaction of EPA that all of the terms of this Order, including any additional tasks that EPA has determined to be necessary, have been completed.

Unilateral Administrative Order 9-2012-10

IT IS SO ORDERED:

UNITED STATES
ENVIRONMENTAL PROTECTION AGENCY

Bv:

Daniel A. Meer, Assistant Director

Superfund Division EPA, Region 9

Date: 16 October 2012

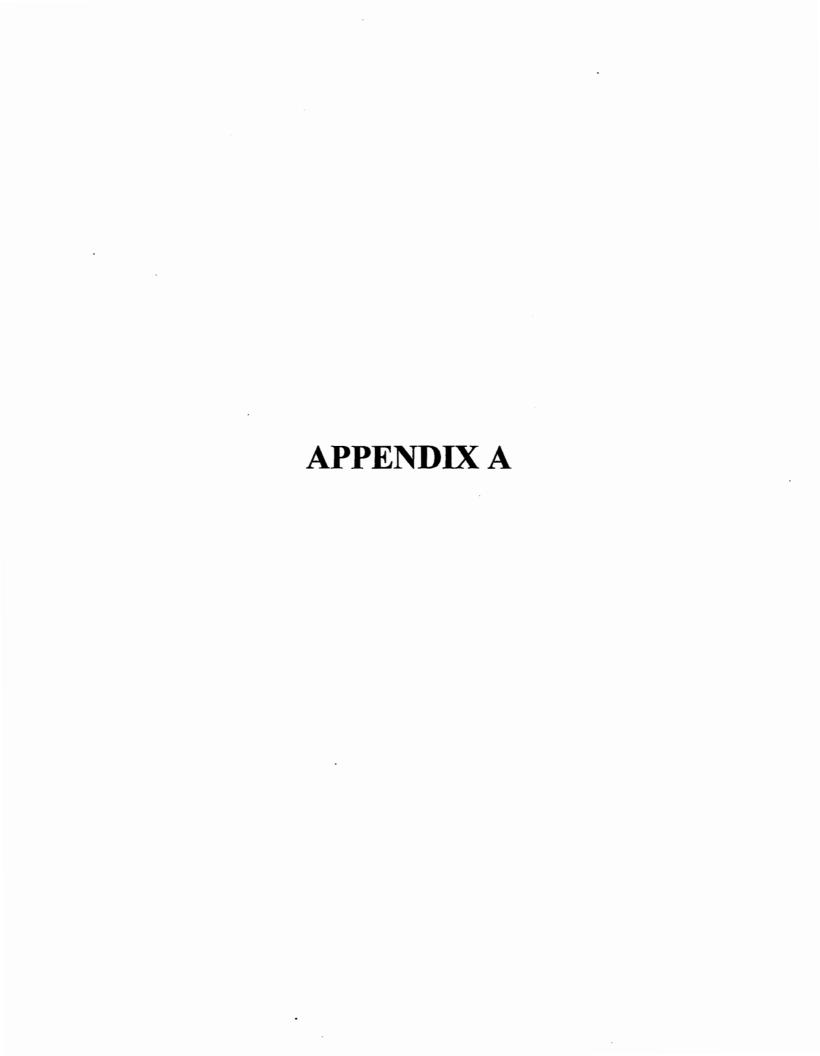
EPA Region 9 Contacts:

Tom Dunkelman, On-Scene Coordinator Superfund Division U.S. EPA, Region 9 901 South Stewart Street, Suite 4001 Carson City, NV 89701 Telephone: (775) 687-9480

Mobile: (775) 721-4712

Larry Bradfish, Assistant Regional Counsel Office of Regional Counsel U.S. EPA, Region 9, ORC-3 75 Hawthorne Street San Francisco, CA 94105 Telephone: (415) 972-3934

Fax: (415) 947-3571





UNITED STATES ENVIRONMENTAL PROTECTION AGENCY REGION IX

75 Hawthorne Street San Francisco, CA 94105

OCT 1 6 2012

MEMORANDUM

SUBJECT: Request for a Time-Critical Removal Action at the McDermitt Site,

McDermitt, Humboldt County, Nevada

FROM: Tom Dunkelman, On-Scene Coordinator

Emergency Response Section (SFD-9-2)

TO: Daniel Meer, Assistant Director (SFD-9)

Response, Planning and Assessment Branch

THROUGH: Harry Allen, Chief

Emergency Response Section (SFD-9-2)

DATE: October 15, 2012

I. PURPOSE

The purpose of this Action Memorandum is to request and document approval of the selected removal action described herein for the McDermitt Site located in McDermitt, Humboldt County, NV and to incur direct extramural costs of up to \$1,950,000.

The proposed response action would mitigate threats to human health and the environment posed by the presence of mercury and arsenic present in calcine material that has been used as fill at multiple locations, including the McDermitt Combined School and numerous residences, within the town of McDermitt, NV and on the Fort McDermitt Paiute Shoshone Indian Reservation. As used in this Action Memorandum, the terms "calcine," "calcine material," and "calcined tailings" refer to crushed mine ore that has been roasted in a furnace. As used in this Action Memorandum, the term "Site" is defined as including the Cordero Mercury Mine and associated claims and property, the McDermitt Mercury Mine and associated claims and property, and all locations within the town of McDermitt and the Fort McDermitt Paiute Shoshone Indian Reservation where roasted ore material (calcine) has come to be located.

Conditions presently exist at the Site that, if not addressed by implementing the response action documented in this memorandum, may lead to continued exposure to mercury and arsenic present in soil. As discussed in this memorandum, these

hazardous substances, if unaddressed, may pose an imminent and substantial endangerment to the public health or welfare or the environment.

The proposed response to the hazardous substances is consistent with removal activities authorized pursuant to Section 104(a) of the Comprehensive Environmental Response, Compensation and Liability Act ("CERCLA"), 42 U.S.C. § 9604(a), and Section 300.415 of the National Oil and Hazardous Substances Pollution Contingency Plan ("NCP"), 40 C.F.R. § 300.415. This response action also incorporates Site investigation activities also authorized by Section 104(a) and (b) of CERCLA, 42 U.S.C. § 9604(a) and (b).

II. SITE CONDITIONS AND BACKGROUND

Site Status: Non-NPL

Category of Removal: Time-Critical CERCLIS ID: NVN000909006

SITE ID: SSID#09WL

A. Site Description

1. Physical location

McDermitt, Nevada is an unincorporated community situated on the Nevada-Oregon border and encompasses approximately 13.2 square miles (8,448 acres) of land area. McDermitt is served by U.S. Highway 95, a major north-south highway linking Boise, Idaho, 192 miles to the north, with Winnemucca, Nevada, 73 miles to the south. The geographical coordinates for the approximate center of McDermitt, Nevada are 41° 59' 51.43" Latitude North and 117° 43' 08.00" Longitude West (Figure 1).

The town area is primarily located east and west of U.S. Highway 95 within the Nevada state boundary; however, the community spans north into the Oregon state boundary. The town area located east of Highway 95 consists of several commercial businesses, numerous residential properties, several paved two lane residential access roads, and mostly unpaved property driveways. The town area located west of Highway 95 consists of several commercial businesses, residential properties, the east-west Cordero Mine Road, and several unpaved residential access roads. According to 2010 United States Census Bureau results, a total of 101 housing units are located within the town of McDerrmitt.

The Site also includes the nearby Fort McDermitt Paiute Shoshone Indian Reservation, which is located in Humboldt County, Nevada, approximately 2.7 miles south of McDermitt. Calcine material is present at two locations on the Fort McDermitt Paiute Shoshone Indian Reservation: an unpaved public access road off the North Road which leads to the Tribal transfer station and an unpaved residential driveway off the South Road.

2. Site characteristics

The Cordero and the McDermitt mercury mine sites are both located in Humboldt County, Nevada and are part of the Opalite Mining District. Two other mercury mines, the Bretz and Opalite Mines which are both located in Malheur County, Oregon (Figure 1) are also part of the Opalite mining district, which is primarily a mercury-producing district, centered approximately 15 miles west of McDermitt, NV and extending north into southern Malheur County, OR.

Cordero Mine Site:

The Cordero and McDermitt mines are inactive mercury mines located adjacent to each other at the end of Cordero Mine Road, approximately 11 miles west-southwest of McDermitt, NV. The geographical coordinates for the approximate location of the Cordero and McDermitt mines are 41° 54' 59.87" Latitude North and 117° 49' 05.31" Longitude West. Outcropping cinnabar ore was first discovered in the area of Cordero and McDerrmitt mines in 1929, and by 1931 the first claims were staked. The property was leased in 1933 to the Bradley Mining Company which produced approximately 45 flasks of mercury before ending their lease. Horse Heaven Mines, Inc. operated the site from 1939 until 1941 and was formed by Sun Oil Company to operate mines in Oregon and Nevada, until the formation of Cordero Mining Company in 1941. The Cordero Mine quickly became a major producer in the Opalite mining district, and by 1941 was the largest producer of mercury in Nevada. The Cordero Mining Company operated surface and underground workings until 1967 when the property was sold to the Fred H. Lenway & Company, Inc., which operated the property until 1970. Between its discovery and the time Cordero mine ceased production in 1970, the Cordero mine produced over 100,000 flasks of mercury. Current site features include the remains of the processing facility, open shafts, head frames, two buildings, and multiple open pits and excavation areas. In addition there is a large calcines pile, which covers approximately 11 acres. This calcines pile is believed to contain roasted ore generated by the Cordero mine. The calcines pile is situated roughly half on BLM land and half on private land (patented claims) owned by Barrick Gold U.S., Inc. that is part of the McDermitt mine. In 1994, Barrick Gold's predecessor, Placer Dome U.S., Inc., constructed a fence around the calcines pile. In December 2011 and January 2012, BLM took action to eliminate physical hazards at the site, including fencing and backfilling certain areas. No environmental assessment of the site has occurred.

McDermitt Mine Site:

The McDermitt Mine is located directly adjacent to, and north of, the Cordero Mine. In 1972, Sierra Mineral Management acquired the property. Placer Amex Inc., in a joint venture with Sierra Mineral Management began underground drilling in 1972. By 1974, Placer Amex Inc. had discovered a new, near-surface mercury ore-body with reserves of approximately 3,000,000 tons of 10 pound/ton mercury ore. In April 1974, construction and stripping of the new McDermitt mine had begun and the mine complex was officially opened in June of 1975. In 1975, the McDermitt mine was the largest and

only mercury mine in production in the United States. Mining operations at the McDermitt mine generally consisted of ore grinding, flotation concentration, mercury distillation, and tailings waste disposal. Placer Amex, which was owned by Placer Development Limited of Canada, Ltd., ultimately became Placer Dome U.S., Inc. Mining operations at the McDermitt mine ceased in the late 1980s and a final closure report was submitted in December 1994 by Placer Dome to the Nevada Department of Environmental Protection (NDEP) requesting final closure approval under Water Pollution Control Permit #NEV88034. As part of the closure plan, the processing plant was removed from the mine site. Barrick Gold U.S., Inc. acquired Placer Dome in 2006. Currently the mine site is non-operational and consists of an approximately 135-acre open-pit, along with closed waste rock dumps and closed tailings ponds.

3. Site evaluation

On June 19, 1987, a Preliminary Assessment Review (PAR) that described potential environmental contaminant problems at the McDermitt mine site was completed by EPA Region IX. The PAR identified annual site inspections by the Nevada Division of Mine Inspection and the NDEP that indicated "hazardous waste problems" associated with the containment of disposed tailings and excessive blood mercury levels in employees working the retort section of the mill. The PAR recommended that more information be gathered regarding general site history, groundwater well locations, population density, and possible future sample locations in order to determine what further action under the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) may be necessary. In February 1988, EPA conducted a Site Inspection (SI) at the McDermitt mine. At that time, the McDermitt mine was not in operation; however, it was reported there were plans for the mine to re-open in the fall of 1988. EPA did not collect any environmental media data (e.g., soil, water) during the SI and recommended no further action under CERCLA.

On December 1, 2009, staff from the EPA Site Assessment program and Emergency Response program conducted a site visit at the Cordero and McDermitt mines to determine if conditions had significantly changed since the 1988 EPA SI Report. This visit was prompted by a request for assistance from the Fort McDermitt Paiute Shoshone Tribe. During that visit, it was pointed out to EPA staff that calcine material, reportedly taken from the Cordero and McDermitt Mine sites) had been used as fill at various locations in the town of McDermitt and on the Fort McDermitt Paiute Shoshone Reservation.

In the fall of 2010, EPA initiated a Removal Assessment, the results of which are detailed in the next section.

4. Release or threatened release into the environment of a hazardous substance, or pollutant or contaminant

In September and October of 2010, EPA initiated a removal assessment. Several study areas were identified for assessment sampling: the Fort McDermitt Pauite Shoshone Indian Reservation, the McDermitt Combined School; roadways in the area of McDermitt, the former Cordero and McDermitt mines; and seasonal surface water drainage pathways downgradient of the Cordero and McDermitt mines. Results of this removal assessment indicated elevated levels of mercury and arsenic at multiple locations including the McDermitt Combined School, numerous roadways in the town of McDermitt and at two locations on the Fort McDermitt Pauite Shoshone Indian Reservation (including one residential driveway and the dirt road leading to the Tribal transfer station) (Figures 2 -4).

In June 2011, EPA and the U.S. Geological Survey (USGS) collected 23 surface soil and calcine samples, with the intent of evaluating the bioavailability of mercury and arsenic. This included analyzing the samples for total mercury, methyl mercury and elemental mercury, conducting sequential extraction analyses, and analyzing mercury speciation by Extended X-Ray Fluorescence (EXAFS) at the Stanford Synchrotron Radiation Lightsource (SSRL). This data was used to support the calculation of site-specific removal action levels for mercury and arsenic. Based on two separate memorandums provided by EPA Region 9 toxicologist Stan Smucker on March 23, 2012, EPA has identified the following site-specific removal action levels for residential soil: 80 parts per million (ppm) mercury and 60 ppm arsenic. EPA did not calculate a site-specific removal action levels for non-residential soil, but instead is relying on the EPA Region IX Regional Screening Levels (RSLs) of 310 ppm for mercuric chloride (and other mercury salts) and 160 ppm for arsenic.

In June 2012, EPA conducted residential soil sampling of properties where it was believed that calcine material may have been used as fill. EPA received permission to sample approximately 60 properties. Soil samples were only collected at properties where calcine material was observed to be present. A total of 92 composite soil samples (excluding duplicates) were collected from within the project area and subjected to field XRF analysis; a total of 44 land parcels, consisting of 92 decision units, were sampled. Of the 92 field XRF analyzed composite soil samples, 55 samples exceeding the soil screening level (SSL) for arsenic and/or mercury were submitted to U.S. EPA Region 9 Laboratory for analysis. Due to the arsenic and mercury data correlation between field XRF results and laboratory analysis results falling below the U.S. EPA criteria for use as screening level data, EPA primarily relied upon the results of the laboratory analyses. However, both the Field XRF analysis results and laboratory analysis results are discussed below.

 Field XRF arsenic concentrations detected in the project area from residential and public land parcels ranged from 8 mg/kg to 492 mg/kg. Of the 92 property samples analyzed by field XRF, 15 samples (16%) had arsenic concentrations that met or exceeded the residential action level of 60 mg/kg. Based on the field XRF analysis data, 13 parcels were identified during this assessment from which samples containing arsenic concentrations in excess of 60 mg/kg were collected. These parcels are identified in Table 1. Field XRF Mercury concentrations detected in the project area from residential and public land parcels ranged from 12 mg/kg to 953 mg/kg. Of the 92 property samples analyzed by field XRF, 58 samples (63%) had mercury concentrations that met or exceeded the residential action level of 80 mg/kg. Based on the field XRF analysis data, 33 parcels were identified during this assessment from which samples containing mercury concentrations in excess of 80 mg/kg were collected. These parcels are identified in Table 1.

• Laboratory arsenic concentrations detected in the project area from residential and public land parcels ranged from 4.5 mg/kg to 97 mg/kg. Of the 55 laboratory-analyzed property samples, 20 samples (36%) had arsenic concentrations that met or exceeded the residential action level of 60 mg/kg. Based on the laboratory analysis data, 16 parcels were identified during this assessment from which samples containing arsenic concentrations in excess of 60 mg/kg were collected. These parcels are identified in Table 1. Laboratory mercury concentrations detected in the project area from residential and public land parcels ranged from 0.87 mg/kg to 230 mg/kg. Of the 55 laboratory-analyzed property samples, 42 samples (76%) had mercury concentrations that met or exceeded the residential action level of 80 mg/kg. Based on the laboratory analysis data, 23 parcels were identified during this assessment from which samples containing mercury concentrations in excess of 80 mg/kg were collected. These parcels are identified in Table 1.

During the course of conducting the removal assessment, EPA conducted informal interviews with residents. Initial interviews indicated that that calcine material present in the town of McDermitt and on the Fort McDermitt Paiute Shoshone Reservation was obtained from the Cordero Mine calcines pile, which is located both on BLM and Barrick-owned property. It is EPA's understanding that local contractors, residents and municipal organizations obtained calcine material from the Cordero calcine pile for use as fill at multiple locations within the town of McDermitt and on the Fort McDermitt Paiute Shoshone Reservation. Calcine material also appears to have been used in road construction in multiple locations in northern Humboldt County, NV and southern Malheur County, OR.

5. National Priorities List ("NPL") status

The Site is not currently on the NPL and NPL listing is not considered likely.

B. Other Actions to Date

1. Potentially Responsible Party Actions

No assessment or closure actions have been performed by the past or current owners or operators at the Cordero Mine.

The McDermitt mine was closed by the owner/operator under a permit from NDEP. In addition, Barrick Gold's predecessor, Placer Dome, constructed a fence around the Cordero Mine calcine pile in 1994.

In December 2011 and January 2012, BLM took action to mitigate physical hazards at the Cordero Mine.

2. EPA Actions

Other than the assessments previously described, EPA has not taken any clean-up action.

C. State and Local Authorities' Roles

1. State and local actions to date

On October 6, 2011, NDEP submitted a request for Federal assistance at the Cordero and McDermitt mine sites. NDEP has also supported EPA during the removal assessment process.

2. Potential for continued state/local response

Neither state nor local agencies have the resources to undertake cleanup of the calcine material present in the town of McDermitt or on the Fort McDermitt Paiute Shoshone Reservation. EPA may request that other state and local response organizations assist and coordinate within the response for necessary tasks within their respective domains, such as traffic planning, community relations, and logistical support.

III. THREATS TO PUBLIC HEALTH OR WELFARE OR THE ENVIRONMENT, AND STATUTORY AND REGULATORY AUTHORITIES

Conditions at the Site represent a release, and potential threat of release, of CERCLA hazardous substances threatening the public health, or welfare, or the environment based on the factors set forth in the National Oil and Hazardous Substances Pollution Contingency Plan ("NCP"), 40 C.F.R. § 300.415(b)(2). These factors include:

A. Actual or potential exposure to nearby populations, animals or the food chain from

hazardous substances or pollutants or contaminants

Elevated levels of mercury and arsenic in surface soil have been documented during the Removal Assessment process. These areas of elevated level of mercury and arsenic are present at multiple locations including residential property in the town of McDermitt, the McDermitt Combined School, and at two locations on the Fort McDermitt Paiute Shoshone Indian Reservation. As such, there is actual or potential exposure to nearby populations from hazardous substances.

B. Actual or potential contamination of drinking water supplies

It is not anticipated that mercury and arsenic associated with the calcine material has impacted drinking water supplies. Mercury is relatively insoluble and is not expected to impact drinking water. The municipal drinking water well in the town of McDermitt has had periodic exceedances of arsenic drinking water standards, but this is typical of many areas in Nevada, and is likely related to naturally occurring arsenic.

C. High levels of hazardous substances or pollutants or contaminants in soils largely at or near the surface, that may migrate

Elevated levels of mercury and arsenic in surface soil have been documented during the Removal Assessment process. It is possible that migration of contaminated surface soil could occur, primarily through aerial transport; although background sampling appears to indicate this is not a significant threat. Subsurface soil sampling appears to indicate that downward migration of mercury and arsenic into underlying soils is not occurring.

D. Weather conditions may cause hazardous substances or pollutants or contaminants to migrate or be released

The Site is located in an area of Nevada that is characterized by extremely variable winds with high velocities throughout much of the year. High winds could contribute to the migration of surface soil; although background sampling appears to indicate that this is not a serious threat.

E. Threat of fire or explosion

There is not a serious threat of fire or explosion at this site.

F. Availability of other appropriate federal or state response mechanisms to respond to the release

There is not another federal or state response mechanism available to address the calcine material that is present in the town of McDermitt or on the Fort McDermitt Paiute Shoshone Indian Reservation. As is discussed in the Proposed Actions section of this Action Memorandum, EPA Region IX has been in discussion with EPA Region IX, BLM,

NDEP and ODEQ about potential cleanup actions at the Cordero and McDermitt, Mines.

IV. ENDANGERMENT DETERMINATION

Actual or threatened releases of hazardous substances from this Site, if not addressed by implementing the response action selected in this Action Memorandum, may present a release or substantial threat of release of hazardous substances into the environment that are appropriate for response actions as authorized by Section 104(a) of CERCLA, 42 U.S.C. § 9604(a).

V. PROPOSED ACTIONS AND ESTIMATED COSTS

- A. <u>Proposed Actions</u>
- 1. Proposed action description

The following response actions will be conducted as part of this removal action:

- (a) Removal of Certain Calcined Tailings
 - Given that the majority of samples collected from calcined tailings located on residential property exceeded the Removal Action Levels for Residential Soil for arsenic and/or mercury, EPA believes that the removal of all calcined tailings from residential Properties within the town of McDermitt and on the Fort McDermitt Paiute Shoshone Indian Reservation is necessary, unless subsequent EPA-approved sampling is conducted which shows that the calcined tailings from a particular residential property do not contain arsenic or mercury in concentrations exceeding the Removal Action Levels for Residential Soil. This would include: (i) approximately 51 residential Properties in the town of McDermitt identified during the removal assessment; (ii) one residential Property on the Fort McDermitt Paiute Shoshone Indian Reservation identified during the removal assessment; and (iii) any additional residential Properties containing calcined tailings which EPA may identify during the Removal Action.
 - Transport of all excavated calcined tailings to the Cordero Mine calcine pile.
 - Backfilling of all excavated areas using suitable fill material.
- (b) Covening of Certain Calcined Tailings
 - Covering in-place of certain non-residential areas containing calcined tailings, as identified by EPA, including (i) the large parking area adjacent to the football field at the McDermitt School; and (ii) long driveways at larger residential Properties which EPA, at its discretion, determines may be covered rather than excavated. Covering would consist of placing an appropriate thickness of suitable material.

The proposed action under the Action Memorandum, does not address potential cleanup actions that could be necessary at the Cordero Mine, the McDermitt Mine, and the Cordero Mine Calcines Pile, and it is possible that additional cleanup action could occur at these mine sites in the future. The proposed action under the Action Memorandum also does not address calcined tailings used as roadbed materials in the town of McDermitt and on the Ft. McDermitt Indian Reservation, because, based on the sampling results, the levels of mercury and arsenic found in these non-residential settings do not warrant further action.

2. Contribution to remedial performance

The long-term cleanup plan for the Site:

Cleanup of calcine material present in the town of McDermitt and on the Fort McDermitt Paiute Shoshone Indian Reservation is expected to be a final remedy, and as such no long-term cleanup is anticipated. It is possible that additional cleanup could occur at any of the mercury mines in the vicinity of the town of McDermitt; however, cleanup actions taken in town and on the Reservation would be consistent with any future work conducted at the mine sites.

Threats that will require attention prior to the start of a long-term cleanup:

Cleanup of calcine material present in the town of McDermitt and on the Fort McDermitt Paiute Shoshone Indian Reservation is expected to be a final remedy, and as such no long-term cleanup is anticipated.

The extent to which the removal will ensure that threats are adequately abated:

By conducting the actions described in this Action Memorandum, this removal action will reduce the threat of exposure to hazardous substances.

Consistency with the long-term remedy:

Cleanup of calcine material present in the town of McDermitt and on the Fort McDermitt Paiute Shoshone Indian Reservation is expected to be a final remedy, and as such no long-term cleanup is anticipated. It is possible that additional cleanup could occur at any of the mercury mines in the vicinity; however, cleanup actions taken in town and on the Reservation would be consistent with any future work conducted at the mine sites.

3. Description of alternative technologies

Alternative technologies are not appropriate for this removal action.

4. Applicable or relevant and appropriate requirements (ARARs)

Section 300.415(j) of the NCP provides that removal actions must attain ARARs to the extent practicable, considering the exigencies of the situation.

Section 300.5 of the NCP defines <u>applicable requirements</u> as cleanup standards, standards of control, and other substantive environmental protection requirements, criteria or limitations promulgated under federal environmental or state environmental or facility siting laws that specifically address a hazardous substance, pollutant, contaminant, remedial action, location or other circumstances at a CERCLA site.

Section 300.5 of the NCP defines relevant and appropriate requirements as cleanup standards, standards of control and other substantive requirements, criteria, or limitations promulgated under federal environmental or state environmental or facility siting laws that, while not "applicable" to a hazardous substance, pollutant, or contaminant, remedial action, location, or other circumstances at a CERCLA site, address problems or situations sufficiently similar to those encountered at the CERCLA site and are well-suited to the particular Site.

Because CERCLA on-site response actions do not require permitting, only substantive requirements are considered as possible ARARs. Administrative requirements such as approval of, or consultation with administrative bodies, issuance of permits, documentation, reporting, record keeping and enforcement are not ARARs for the CERCLA response actions confined to the Site.

The following ARARs have been identified for the proposed response action. All can be attained.

<u>Federal ARARs:</u> Potential federal ARARs may include the CERCLA Off-Site: Disposal Restrictions, 40 C.F.R. § 300.440; and the National Historic Preservation Act, 16 U.S.C. § 470f; 36 C.F.R. Part 800.

State ARARs: Potential state ARARs may include the Action Levels for Contaminated Sites regulations at Nevada Administrative Code 445A.2269-2272.

5. Project schedule

The removal action is anticipated to start after the approval of the action as indicated by the signature on this memorandum. The removal activities will require approximately three months to complete.

B. Estimated Costs

Cost estimates are based on existing Emergency and Rapid Remedial Response

Services (ERRS) rates for the EPA Region 9 contracts.

Extramural Costs

Regional Removal Allowance Costs

Cleanup Contractor (ERRS) \$ 1,500,000 ERRS Contingency (20%) \$ 300,000

TOTAL, Removal Action Project Ceiling \$ 1,800,000

START Contract Costs \$ 150,000

TOTAL, Extramural Costs \$ 1,950,000

VI. EXPECTED CHANGE IN THE SITUATION SHOULD ACTION BE DELAYED OR NOT TAKEN

Given the Site conditions, the nature of the hazardous substances documented on-Site and the potential exposure pathways to nearby populations described in Sections III and IV above, actual or threatened releases of hazardous substances from the Site, if not addressed by implementing the response actions selected in this memorandum, present a release or substantial threat of release of hazardous substances into the environment. If no action is taken, calcine material containing elevated levels of mercury and arsenic will remain on residential properties and on school grounds, and will continue to pose an exposure risk.

VII. OUTSTANDING POLICY ISSUES

This removal action addresses calcine material present in the town of McDermitt and on the Fort McDermitt Paiute Shoshone Indian Reservation. It does not address cleanup of any of the nearby mercury mines, which could require additional remediation.

VIII. ENFORCEMENT

Please see the attached Confidential Enforcement Addendum for a discussion regarding potentially responsible parties and enforcement. In addition to any extramural costs estimated for the proposed action, a cost recovery enforcement action also may recover the following intramural costs:

Intramural Costs¹

^{1.} Direct costs include direct extramural costs and direct intramural costs. Indirect costs are calculated based on an estimated indirect cost rate expressed as a percentage of site-specific direct costs, consistent with the full cost accounting methodology effective October 2, 2000. These estimates do not

U.S. EPA Direct Costs

Intramural \$ 50,000 Extramural (from above) \$ 1,950,000

U.S. EPA Indirect Costs

(36.19% of Direct Costs(\$2,000,000)) \$\frac{723,800}{2,723,800}\$

The total EPA extramural and intramural costs for this removal action, based on full-cost accounting practices, that will be eligible for cost recovery, are estimated to be \$2,723,800.

IX. RECOMMENDATION

This memorandum proposes a removal action for the McDermitt Site, located in McDermitt, Nevada, as developed in accordance with CERCLA and not inconsistent with the NCP. This decision is based on the Administrative Record for the Site. Because conditions at the Site meet the NCP criteria for a time-critical removal, I recommend that you concur on the determination of imminent and substantial endangerment, the proposed removal action and the anticipated intramural and extramural direct costs of \$2,723,800. Your approval below will establish as agency action the determination of the imminent and substantial endangerment and the selection of the response action.

Approve:	Sagger	16 October 2012			
	Daniel Meer, Assistant Director (SFD-9) Superfund Division	Date			
Disapprove:					
	Date Daniel Meer, Assistant Director (SFD-9) Superfund Division	Date			

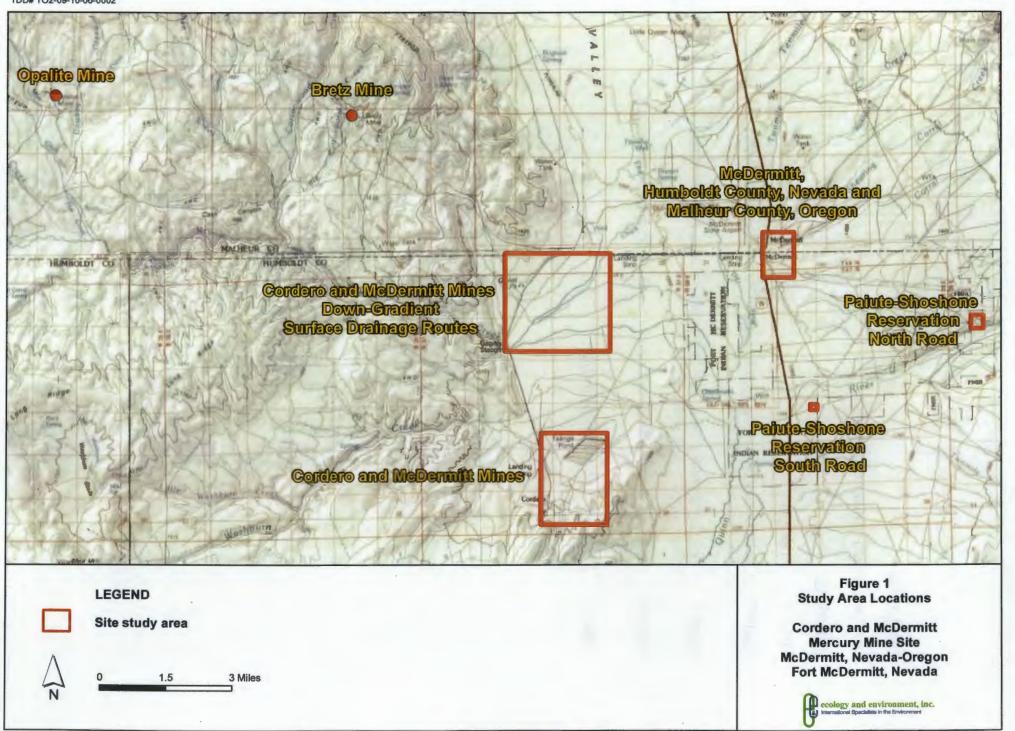
include pre-judgment interest, do not take into account other enforcement costs, including Department of Justice costs, and may be adjusted during the course of a removal action. The estimates are for illustrative purposes only and their use is not intended to create any rights for responsible parties. Neither the lack of a total cost estimate nor deviation of actual costs from this estimate will affect the United States' right to cost recovery.

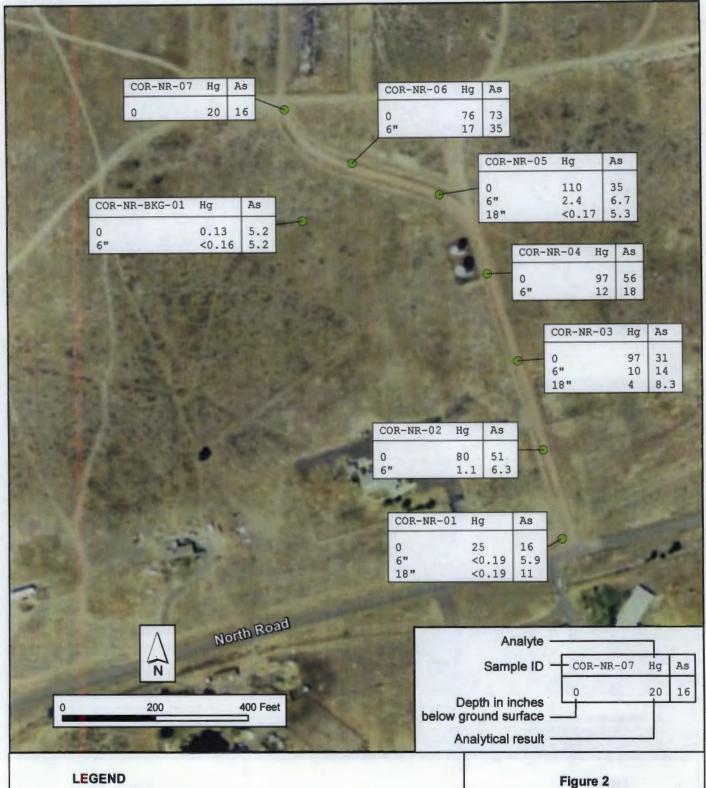
Attachments

Confidential Enforcement Addendum

Appendices

Figure 1.	Area map
Figure 2.	Soil Concentration Map, Fort McDermitt Paiute Shoshone Indian Reservation, North Road
Figure 3	Soil Concentration Map, Fort McDermitt Paiute Shoshone Indian Reservation, South Road
Figure 4.	Soil Concentration Map, McDermitt Combined School and McDermitt Roadways
Table 1.	Residential soil sampling results





Discrete soil sample location

ABBREVIATIONS

Hg Mercury As Arsenic

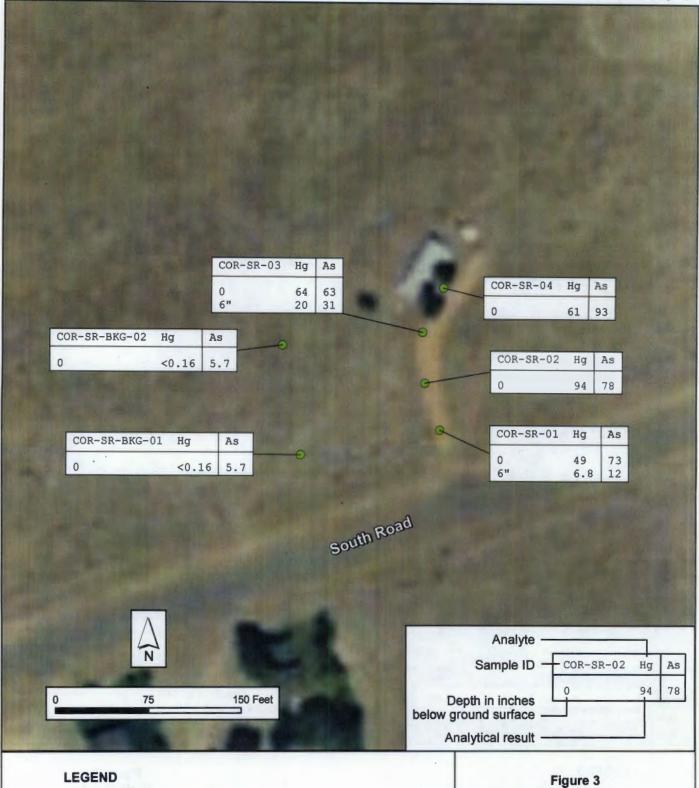
NOTES

Analytical results in milligrams per kilogram (mg/kg)

Figure 2 **North Road**

Cordero and McDermitt Mercury Mine Site Paiute Shoshone Indian Reservation Fort McDermitt, Nevada





Discrete soil sample location

ABBREVIATIONS

Hg Mercury As Arsenic

NOTES

Analytical results in milligrams per kilogram (mg/kg)

South Road

Cordero and McDermitt Mercury Mine Site Paiute Shoshone Indian Reservation Fort McDermitt, Nevada



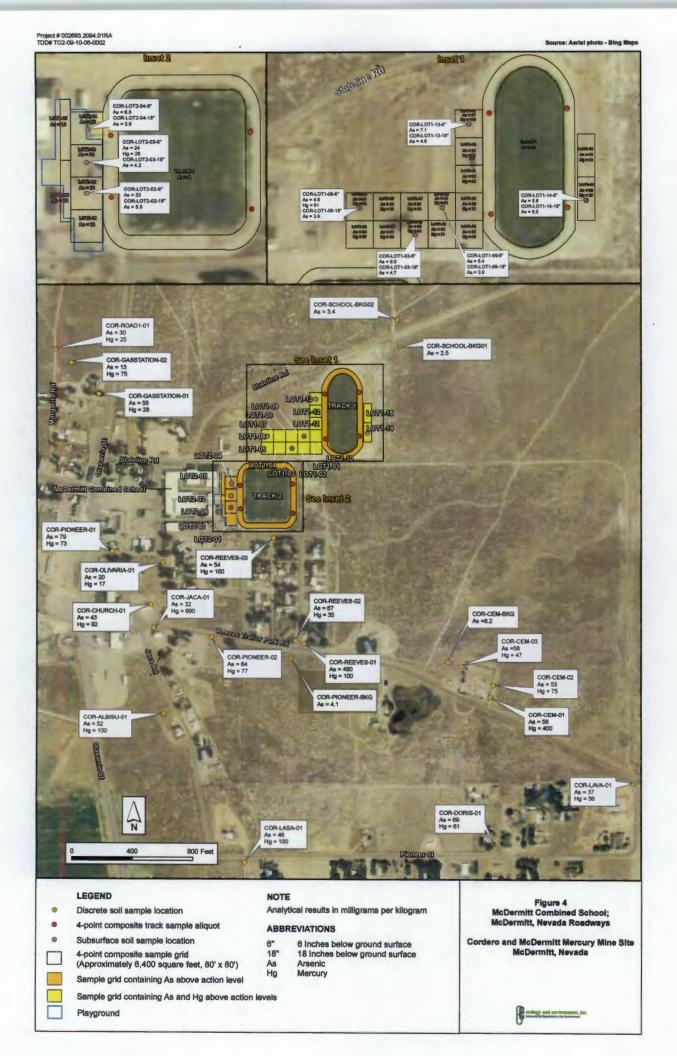


TABLE 1

McDermitt, Humboldt County, Nevada and Maiheur County, Oregon Mine Waste Removal Assessment at Properties of Release or Threatened Release Property Owner Information and Soil Sample Data Summary

								Total Arsenic (TAs)	Total Mercury (1
					The same of the		U.S. EPA Site-Specific Action Level, Residential Sml	50 (mg/kg)	80 (mg/kg)
operty Address/ scription	Street Name	Parcel Identification Number	Owner Name	Owner Address	Owner City, State	Owner Zip Code	5-Paint Compasite Soil Sample Location	⁽³¹ XRF Result (mg/kg)	⁽³⁾ XRF Result (mg/kg)
RNES ROAD									
							Driveway, East of Residence	60	134
							Backyard, South of Residence	63	91
CKSKIN ROAD									- With
						1	Backyard, East of Residence	8	<lod< td=""></lod<>
							Frontyard, Buckskin Rd. right-of-way	58	65
						- Line	Driveway (North Side), South of Residence	9	18
-							Drivewey (North Side)	64	123
							Orivewey (South Side)	492	131
							Frontyard, Buckskin Rd. right-of-way	56	97
							Driveway, South of Residence	63	127
	100						Backyard (1), East of Residence	39	75
							Backyard (2), East of Residence	36	100
							No sample; calcine material not visibly apparent		-
							Frontyard, Buckskin Rd. right-of-way	42	73
							Backyard, East of Residence	87	103
RDERO MINE RO	OAD								
			8				No sample; calcine material not visibly apparent	_	-
							Sideyard, West of Residence/Casino (1)	56	86
							Sideyard, West of Residence/Casino (2)	21	51
							Driveway, West of Residence	14	51
							Backyard, South of Residence	30	75
RA COURT									
							Frontyerd, South of Residence	50	75
							Backyard, North of Residence	49	90
							Driveway, West of Residence	47	81
						The same of the sa	Driveway, South of Residence	57	97
The same							Backyard, East of Residence	61	90
							No sample; calcine material not visibly apparent		-
IS COURT	The state of the s	13/2011							A PROPERTY.
							Drivaway, West of Residence	48	112
							Driveway, West of Residence	46	88
							Backyard, East of Residence	50	111
							Sideyard, South of Residence	44	50

McDermitt, Humboldt County, Nevada and Malheur County, Oregon Mine Waste Removal Assessment at Properties of Release or Threatened Release Property Owner Information and Soll Sample Data Summary

								Total Arsenic (TAs)	Total Mercury
							U.SEPA Site-Specific Action Level, Residential Soil	100 (mg/kg)	an imp/s
erty Address/	Street Name	Percel Identification Number	Deerser Nanie	Owner Address	Owner City, State	Owner Zip Code	5-Point Composite Soil Sample Location	¹³¹ XRF Result (mg/kg)	(3)XRF Resu (mg/kg)
HWAY 95				THE RESERVE AND ADDRESS OF THE PERSON NAMED IN					
							No sample; calcine material not visibly apparent		-
							Driveway, South of Structure	36	77
							Driveway, East of Structure (Front)	4.00	12
							Driveway, South of Structure (Side)	38	79
DRIVE									
							Frontyard, West of Residence	38	111
							Sideyard, North of Residence	9	<l00< td=""></l00<>
							Sideyard, South of Residence	25	62
							Frontyard, West of Residence	12	14
							Driveway, North of Residence	51	135
							Frontyard, Jaca Dr. right-of-way	25	51
							Frontyard, Jaca Dr. right-of-way	20	33
							Vacant Lot, West of Jaca Dr.	71	152
							Driveway, South of Residence	52	83
DRIVE									
							Driveway, West of Residence	45	85
							Sideyard, West of Residence	56	65
							Driveway, East of Residence	49	64
							Sideyard Driveway, South of Residence	46	81
							Small Driveway, Immediatly South of Lasa Dr.	31	953
							Driveway, Unknown Mobile Home	65	118
							Driveway, East and North of Residence	47	72
							Entrance Driveway/Road	51	158
							Entrance Driveway/Road	56	109
							Residence Driveway, West of Barnes Rd.	23	39
							Frontyard Driveway, South of Residence	59	123
						1	Sideyard Oriveway, East of Residence	58	132
							No sample; calcine material not visibly apperent		_
							Frontyard, Lasa Dr. right-of-way	57	91
							Driveway, West of Residence (Black Material)	29	252
							Backyard, South of Residence	50	70
-							Pioneer Rd. right-of-way	49	90
							Fenced Area North of Residence	51	110
							Fenced Area North of Residence	43	110
							Stockpile, North of Residence	51	76
			1 100				Lasa Dr. and Doris Ct. right-of-way	51	85

McDermitt, Humboldt County, Nevada and Malheur County, Oregon Mine Waste Removal Assessment at Properties of Release or Threatened Release Property Owner Information and Soll Sample Data Summary

								Total Arsenic (TAs)	Total Mercury (
_							U.S. EPA Site Specific Action Level, Residential Sul-	250 (mg/kg)	80 (mg/k)
erty Address/ ription	Street Name.	Parcel Identification Number	Owner Name	Owner Address	Owner City, State	Owner Zip Code	5 Point Composite Suil Sample Location	⁽³⁾ XRF Result (mg/kg)	(3)XRF Resu (mg/kg)
RGARITA ROA	D								
							No sample; calcine material not visibly apparent	-	
-							Margarita Rd. right-of-way	41	87
							Vacant Lot East of Roadway	32	247
ARRIA ROAD									
			-				Vacant Lot, West of Residence	26	24
							Driveway, Reeves Trailer Park	25	386
					2		Olivarria Rd. and Pioneer Rd. right-of-way	37	103
NEER DRIVE									
							Vacant Lot	13	35
							Vacant Lot	22	32
							Vacant Lot	42	51
			mends	-			Field North of Residence	28	89
							Access Drive North of Residence	61	92
							Access Drive South of Residence	50	115
							Ploneer Dr. right-of-way	54	76
							Frontyard, West of Humbolt Co. Ubrary	8	18
							No sample; calcine meterial not visibly apparent		
VES ROAD				The state of the s				and the same	
							Reeves Rd. and Opelite Rd. right-of-way	57	120
							Driveway, West of Residence	44	98
							Frontyard, Reeves Rd. right-of-way	62	130
							Driveway, North of Residence	50	95
							Frontyerd, Reeves Rd. right-of-way	53	82
							Driveway, South of Residence	59	93
							Backyard, East of Residence	66	143
							Frontyard, Reeves Rd. right-of-way	83	191
							Driveway, East of Residence	27	82
							Reeves Rd. right-of-way	53	136
							Sideyard, North of Residence	<1.00	<lod< td=""></lod<>
							Driveway	21	81
							Reeves Rd. right-of-way	68	126
							Pioneer Dr. right-of-way	59	115
						-	Reeves Rd. right-of-way	67	105

McDermitt, Humboldt County, Nevada and Maiheur County, Oregon Mine Waste Removal Assessment at Properties of Release or Threatened Release Property Owner Information and Soil Sample Data Summary

									1
								Total Arsenic (TAs)	Total Mercury (T
							U.S. EPA Site-Specific Action Level, Residential Soil	(1160 (mg/kg)	⁽² ′80 (mg/kg)
operty Address/ escription	Street Name	¹³¹ Parcel Identification Number	ner Name	Owner Address	Owner City, State	Owner Zip Code	5-Point Composite Soil Sample Location	(31XRF Result (mg/kg)	¹¹ XRF Result (mg/kg)
ATELINE ROAD									
								29	38
NKNOWN STREE	ET NAME								
							Driveway, East of Residence	30	53
	Control of the						Driveway, East of Residence	31	71
NKNOWN STREE	ET LOCATIONS								
							Backyard, South of Residence	34	107
		9.3 经证明 处理 是	党的基础的企业或主要 。		全国基金的		Vacant Fenced Area for Mobile Home	52	101



SCOPE OF WORK U.S. EPA Docket No. 9-2012-10 UNILATERAL ADMINISTRATIVE ORDER McDERMITT SITE REMOVAL ACTION

The Respondent shall conduct the response actions described below as part of the McDermitt Site Removal Action. This Scope of Work is attached to the Unilateral Administrative Order ("Order") cited above, and all terms used herein shall have the meanings assigned to them in that Order.

- (a) Removal of Certain Calcined Tailings:
 - Removal of all calcined tailings from residential Properties within the town of McDermitt and on the Fort McDermitt Paiute Shoshone Indian Reservation, unless subsequent sampling by Respondents, as approved by EPA, shows that the calcined tailings from a particular residential Property do not contain mercury or arsenic in concentrations exceeding the Removal Action Levels for Residential Soil, including: (i) approximately 51 residential Properties in the town of McDermitt identified during the removal assessment; (ii) one residential Property on the Fort McDermitt Paiute Shoshone Indian Reservation identified during the removal assessment; and (iii) any additional residential Properties containing calcined tailings which EPA may identify during the Removal Action.
 - Transport of all excavated calcined tailings to the Cordero Mine calcine pile on the Barrick property for disposal as approved by EPA.
 - Backfilling of all excavated areas using suitable fill material.
- (b) Covering of Certain Calcined Tailings
 - Covering in-place of certain non-residential areas containing calcined tailings, as identified by EPA, including (i) the large parking area adjacent to the football field at the McDermitt School; and (ii) long driveways at larger residential Properties which EPA, at its discretion, determines may be covered rather than excavated.
 - Covering would consist of placing an appropriate thickness of suitable material.

Table - 1. Deliverables Schedule

The effective date of the Order ("the Effective Date") is ten (10) days after the date the Order is signed.

DELIVERABLE	DUE DATE
Notice of Intent to Comply	Within ten (10) days after the Order is signed unless a conference is requested. If a conference is requested, the notice of intent to comply is due within three (3) days after the conference
Request conference (opportunity to confer)	Within seven (7) days after the Order is signed
Notify EPA in writing of the name, title and qualifications of the individual(s) who will be responsible for carrying out the terms of this Order, and the name(s) of any contractor(s) or subcontractor(s)	Within seven (7) days after the Effective Date of the Order
Conference (opportunity to confer)	The conference will be held within fourteen (14) days after the request for conference
Provide EPA with documentation that adequately demonstrates its financial ability to complete the work to be performed pursuant to this Order	Within twenty-one (21) days after the Effective Date of this Order
Submit a Work Plan for the removal activities to be performed as set forth in this Order	Within twenty-one days after the Effective Date of the Order
Written report on completion of any transportation of hazardous substances or wastes for disposal or recycling. This report should contain a summary of the activities to comply with this Order	Within forty-five (45) days after completing the Response Action